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Topographic engineer awarded Medal of Honor

By Heike Hasenauer

A former engineer officer is the latest recipient of the Medal of Honor, the nation's highest honor for military service.

President George W. Bush awarded the Medal of Honor to Lt. Col. Bruce Crandall (ret.) for his actions in Vietnam's Ia Drang Valley in 1965. Crandall's actions were part of the legendary battle detailed in the book "We Were Soldiers Once and Young," and the recent Mel Gibson movie by the same name.

How an Army engineer becomes a helicopter pilot harkens back to the earliest days of Army helicopter aviation. Crandall was a draftee, inducted into the Army on Jan. 3, 1953. He was a topographic engineer, and in those days topographic engineers were trained to fly the Army's small, early helicopters. That's how the topos got the lay of the land, and how they took aerial photos of topographic features to draw maps.

"We were bush pilots who flew in areas of the world that hadn't yet been mapped," Crandall said.

In the 1950s, the job took Crandall to some of the wild, remote areas of the world. Early in his career, Crandall flew over and mapped the Arctic Slope. He mapped oil-reserve areas at the U.S. Naval Petroleum Reserve, and performed the same type of mission in Libya



Under intense enemy fire, Maj. Bruce Crandall in his UH-1 extracts wounded in the Ia Drang Valley. (U.S. Army Photo)

in 1956 and 1957. Then he mapped the interior of Costa Rica where the challenges included flying over three active volcanoes.

"In 1954 and 1955, the Army's 30th Topographic Unit was the largest aviation outfit in the world," said Crandall.

So the topographic engineers were a corps of experienced helicopter pilots that

the Army tapped when it began training combat pilots.

"I had very experienced pilots," Crandall said. "Three out of the four company commanders in the 229th Aviation Regiment in Vietnam were engineers."

On Nov. 14, then-Lt. Col. Harold Moore, commander of the 1st Cavalry Division's 1st Battalion 7th Cav. Regiment, depended on then-Maj. Crandall's helicopters to insert the 1st Bn. into what would become the most vicious fight of the Vietnam War to that date.

The battle took place in the Central Highlands of the Ia Drang Valley, at a place called Landing Zone X-Ray.

Crandall commanded 16 helicopter crews of the 1st Cav. Div.'s Company A, 229th Assault Helicopter Bn., which lifted troops on a search-and-destroy mission from Plei Me to LZ X-Ray.

On the fifth and final troop lift, which involved eight helicopters, the LZ was under horrific enemy fire by small arms, automatic weapons, mortars, and rockets.

As Crandall's helicopter landed and Soldiers exited, three Soldiers were wounded and three were killed. Remaining helicopters waiting to land were ordered to abort and return to base.

Corps launches IM/IT MEO

The U.S. Army Corps of Engineers has announced the final performance decision is in favor of the Most Efficient Organization for the Information Management/Information Technology A-76 competition.

The new IM/IT operation is expected to save up to \$1 billion during the next six years.

The competition was initially completed in March 2006, and the government's Most Efficient Organization (MEO) was selected based on lowest price, technically acceptable. After subsequent protests, the final performance decision is the selection of the MEO.

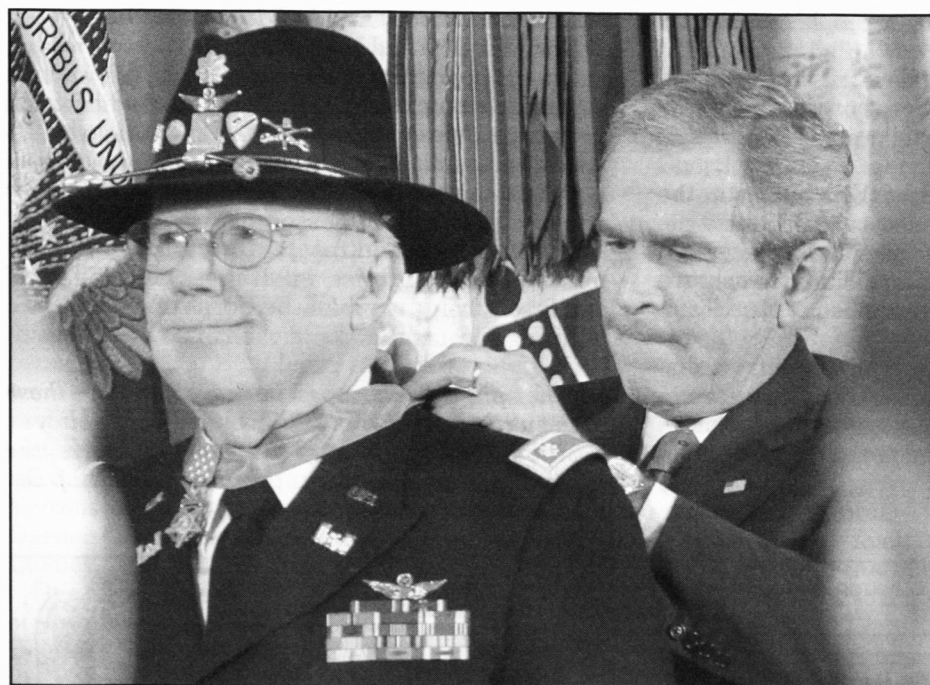
The Corps will sign a Letter of Obligation with the MEO on April 18, and implementation of the new organization will begin immediately following. The MEO organization, Army Corps of Engineers Information Technology (ACE-IT), will have a one-year phase-in period, a one-year base period, and four one-year option periods.

To deliver the full range of IM/IT services, ACE-IT has partnered with Lockheed-Martin to provide contract support. Lockheed-Martin worked closely with the team that developed the government's tender under the competition to address contracting needs.

The ACE-IT organization will be headquartered in Vicksburg, Miss., with 55 local offices at Corps offices throughout the U.S.

The competition began in June 2004, and involved work performed by about 1,300 DoD civilian employees and more than 500 contractors at Corps locations throughout the U.S. The competition included these services:

- Automation services and systems support.
- Communications services and systems support.
- Information assurance service and support.
- Record management services and support.
- Printing and publication services.
- Visual information services.
- IM/IT administration and management.



President George Bush fastens the Medal of Honor around Crandall's neck. (U.S. Army Photo)

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Insights

'Never accept defeat' is the spirit of a warrior

Col. Sherrill Munn
Chaplain, U.S. Army Corps of Engineers

(This is the second in a series about the Warrior Ethos.)

Last month I began a four-part series about the Warrior Ethos. We learned that ethos means, "The guiding beliefs, standards, or ideals that characterize a group, community, or ideology," according to Webster's Third New World Dictionary. For the Soldier those guiding standards are found in these four statements:

I will always place the mission first.

I will never accept defeat.

I will never quit.

I will never leave a fallen comrade.

This month I focus on the second principle, "I will never accept defeat."

The heart of the warrior

This statement captures the heart of the warrior. It expresses the spirit of the offensive. If the first principle sets priorities and focuses us on the essential, the second one is all about action, doing what is necessary to accomplish the mission. It has to do with both the internal spirit of the Soldier, and the external actions necessary to win the victory.

However, before we go further, what do we mean by defeat? Webster's New World Dictionary defines it as "To win victory over; to bring to nothing, to frustrate." Synonyms include "repulse, conquest, rout, subjugation, destruction, ruin, loss, beating." We would not want our warriors to tolerate any of these words.

Still, battles and even wars have been lost despite the best that the Soldier can give. A classic example was the Army of Northern Virginia under Gen. Robert E. Lee. His Soldiers were arguably the best infantry in the world at the time and yet were compelled to surrender.

At the beginning of World War II, the United States lost battle after battle in North Africa and across the Pacific. The defeats at Kasserine Pass and Corregidor are notable examples.

Setback, not defeat

So, how can a Soldier say they will never accept defeat?

Two answers come to mind. The first is that in combat, as in life, we can be overwhelmed by events out of our control. Neither Gen. Lee nor his Soldiers could do anything about the South's inability to supply food, ammunition, and replacements any more than they could about the North's unending logistics.

Maj. Gen. O.P. Smith during the Korean War could do little about the fact that Chinese Communist forces by the tens of thousands had moved undetected to his flank and rear surrounding his 1st Marine Division near the Chosin Reservoir in North Korea.

The second answer is that the principle "I will

never accept defeat" expresses the indomitable spirit of the Soldier, and we see this spirit in both examples.

When Lee recognized his situation was hopeless and decided to surrender, he did so over the strong opposition of his Soldiers. Even having suffered all they had gone through, short on ammunition, starving, facing impossible odds, they wanted to fight on.

When Smith was questioned about the retreat from the Chosin Reservoir, he replied, "Retreat, hell! We're attacking in a different direction!" This spirit allows Soldiers to overcome the most difficult circumstances to win the victory. It allows them to overcome the loss of a battle, regroup, come back and win the war.

Spiritual resources

Such a spirit springs from several sources. It comes from tough realistic training, from knowing your job and tasks thoroughly, from trust in your country and in your leaders, from your commitment to your team and your buddies, from the sense that you are doing the right thing.

For many, it also comes from their faith in God. Faith can be the source of great spiritual strength. When one really believes that he or she is in the providential care of God, that the Lord truly is "my refuge and my fortress" (Psalms 91:2), the resulting sense of inner peace and divine presence can give an invincible courage to face whatever battles life presents.

Also in life

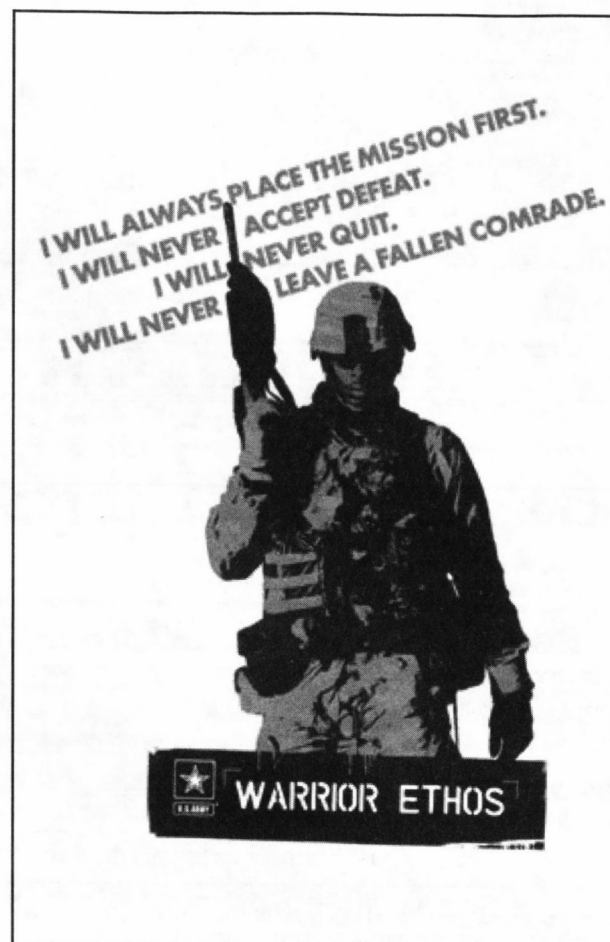
This moral imperative never to accept defeat is not just for the Soldier, but an essential spiritual attitude for all of us in government service, and particularly in the U.S. Army Corps of Engineers. The moral strength that comes from this "spirit of the offensive" gives us the courage and inner fortitude to face and overcome any setbacks, losses or challenges as individuals and as a Corps.

When the second principle of the Warrior Ethos is lived out in our lives and work, we become an invincible organization that our people can depend upon to win the victory.

Fortunately, this indomitable spirit is often manifested in the people of the Corps of Engineers, no more so than in our great folks in New Orleans District.

While hundreds of them lost their homes in the Katrina floods and had to relocate to other towns, they continued in the midst of personal disaster and extreme hardship to work sacrificially to achieve the missions of the Corps in response to Hurricane Katrina.

They, along with all those who came from districts across the U.S. Army Corps of Engineers in the aftermath of Katrina and Rita, despite setbacks and incessant criticism in the press, have made remarkable progress in the recovery of New Orleans and the Gulf Coast.



Google Images

WRAMC warriors

I have the great privilege to visit our wounded soldiers in Walter Reed Army Medical Center regularly. These remarkable people exemplify the Warrior Ethos even while recovering from severe wounds. I recently visited a Soldier, a sergeant first class infantry platoon leader. He was on a security mission in Ramadi, Iraq, when his armored vehicle was hit by a powerful IED buried in the roadway.

His medic and driver were killed and he was severely wounded by shrapnel. His left leg was so badly injured that his doctor told him if this injury had occurred 10 years ago, he would have lost his leg. However, medical care has progressed to where the leg can now be saved through bone, muscle, and skin grafts.

Courage & resolve

As we talked, this great platoon sergeant wanted only two things — to recover, and to get back to his men in Iraq to finish the mission. When we prayed, I asked for his healing and for the care of his men still in Iraq, who were his primary concern.

Despite all he had been through, his focus was on the mission and his men. If anything, his wounds seemed to strengthen his resolve. This Soldier would accept neither defeat physically from his wounds nor in accomplishing his unit's mission in Iraq.

The statement of the Warrior Ethos, "I will never accept defeat," encompasses a moral attitude that gives us courage and resolve to act, to do what we must to fulfill our mission. It gives us strength of spirit that helps to make the Corps of Engineers a winning organization, and each of us victorious in life.

(The opinions expressed in this article are those of the writer and do not reflect the official policy or position of the U.S. Army Corps of Engineers, the Department of the Army, the Department of Defense, or the U.S. government.)



Commentary

Proud to be part of the Iraq mission

By Thomas O'Hara
Kansas City District

As I complete my third tour in Iraq, and after having spent portions of four of the last five years as part of the efforts on the ground in Iraq, I leave here (again) with a sense of pride in my organization, the U.S. Army Corps of Engineers, and with another verification of my belief that the Iraqi people are some of the most wonderful people on the face of this earth.

When I go home I'll be asked the same questions: "What was it like?"

"How bad is it?"

"Why are we there?"

"Why do you keep going back?"

And my answers will be the same...

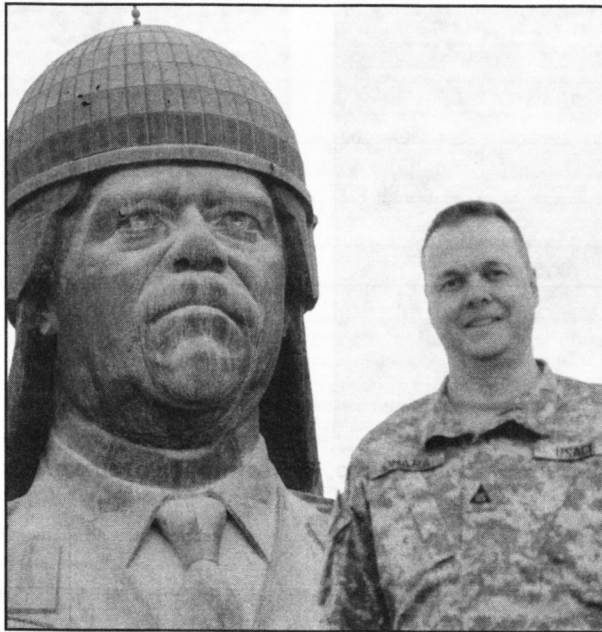
"Not as bad as you hear on TV."

"An incredible experience."

"We're there to help these amazing people build a foundation for freedom."

"Because I believe in the mission and we should be there."

When people get past the questions that they would not still be asking if this effort were properly conveyed by the national media, I'll also tell them that I saw incredible progress on this last tour. The Iraqis taking the lead in the construction and management of essential services, not only is their infant government working through the kinks of managing billion-dollar budgets and coordinating activities across



Thomas O'Hara poses with a statue of Saddam Hussein in Iraq. (Photo courtesy of Thomas O'Hara)

the nation. With respect to my lane, public affairs, the Iraqis are taking the lead in communicating with other Iraqis about the progress on the ground.

This tour I was fortunate to work with more and

more Iraqi patriots who challenge the threat of public identification and face the fear instilled by criminal militant gangs. As a public affairs officer, the more the Iraqi people can communicate the story, the less there is need for me to assist.

I have never been more proud to be worked out of a job. This is still the greatest story *not* being told. The U.S. should not only be proud of our troops, but proud of the job they are doing, and succeeding here on the ground.

The Corps is breaking ground and continues to show progress four years after the liberation of Iraq. More than 3,000 projects completed, 1,000 more ongoing or planned. Hundreds of schools renovated, nearly two dozen hospital projects, more than 100 primary health centers being built, 75 percent of the country with twice as much electric power than before the war. The progress on the ground is a laundry list of sweat, tears, and blood by both coalition and Iraqi workers.

I am proud to be a part of it.

Essays!

(Thomas O'Hara was finishing his third tour of duty in Iraq when he wrote this article. He is now back home in Kansas City District.)

(The opinions expressed in this article are those of the writer and do not reflect the official policy or position of the U.S. Army Corps of Engineers, the Department of the Army, the Department of Defense, or the U.S. government.)

'Extreme Makeover' builds war vet home

By Mary Beth Hudson
Tulsa District

Sunday evening, April 22, was quiet at Fort Sill, Okla., and nearby Lawton. Most citizens and Soldiers (including members of Tulsa District's Fort Sill Resident Office) were watching "Extreme Makeover: Home Edition," which featured the construction of a home that hundreds of them helped build.

Gene Westbrook, a senior NCO from Fort Sill, returned home from Iraq paralyzed by war injuries. Through local donations, the Westbrooks were equipped with a wheelchair-adapted van.

In a tragic twist of fate, the Westbrooks were in an automobile accident that left their son a paraplegic and resulted in a daughter losing a kidney.

Many folks from the Lawton area lobbied to have the Westbrooks featured in the popular show. On Feb. 15, they got their wish. That morning, a knock on the door signaled the start of a few frenzied days and nights when their 1,200-square-foot home was demolished and replaced with a new home that is completely accessible to wheelchairs.

Building day started with dramatic flair when a British tank plowed into the home to begin demolition. Track-hoes and bulldozers finished the job.

Then the lot filled with hundreds of volunteer. Several of Tulsa District's Fort Sill Resident Office (FSRO) personnel took annual leave to work as safety officers. They were teamed with counterparts from the post's Department of Public Works. Burl Ragland, installation engineer and former Corps employee, was the Safety Team leader and helped coordinate some key construction logistics. FSRO volunteers were Walt Garner, Todd Hughes, Dennis McCants, George Lumley, Brad Carter, and Rick West.

"It's amazing how quickly 1,300 volunteers, most of whom have never worked together, can get through the learning curve when everyone has the same objective and no task is beneath them," West said. "Communication is key, and perhaps the only factor separating orderly chaos from catastrophic failure."



Many people working together allowed "Extreme Makeover: Home Edition" to build a completely wheelchair-accessible new home in just a few days. (Photos courtesy of Tulsa District)

He said the Corps volunteers were all excited about the opportunity to give something back to the community and be a part of this special project.

Numerous lights were set up and some of the neighborhood was displaced to accommodate the 24/7 operation. The schedule called for demolition first thing Saturday morning and concrete placement that night. Shortly after, prefabricated walls and trusses were delivered by truck and erected.

The bulk of construction was done in 106 hours. West said, "Before actual start of the work, several members of the Fort Sill Resident Office team helped a local equipment supplier fabricate two manifolds capable of running up to 20 nail-guns simultaneously off a commercial compressor. They looked a little strange, but I saw one of them in operation when the framing crews started, and it worked fine."

According to one of the project superintendents, Randall Kendall, one of their challenges was as much cultural as physical. They had to transform the execution approach from traditional horizontal build that would take four to six months to a vertical build with less than a week to complete. Careful planning, material selection, proper equipment, and using available supplies were fundamental to success.

There were many safety challenges. It was a congested site with narrow streets and limited access. "Most of my time was spent guiding and spotting equip-



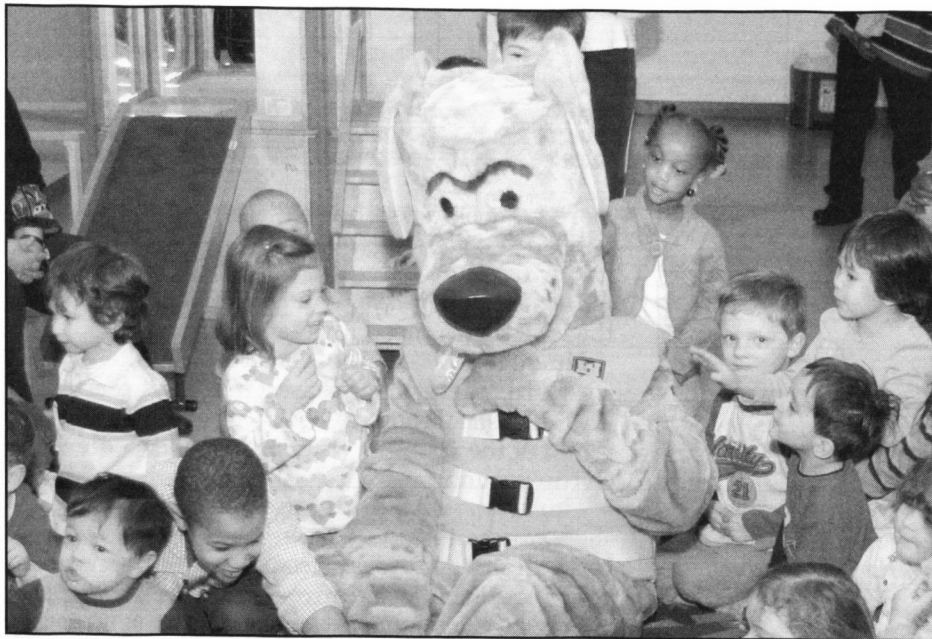
ment and ensuring that other volunteers did not put themselves in harm's way," West said. "During the peak of the afternoon, there were in excess of 100 workers, numerous production crew, and three to six pieces of equipment running at any given time."

Ragland estimates that 26,400 volunteer man-hours were worked without any significant injury. The "Extreme Makeover: Home Edition" crew told him this was the best safety team ever assembled for the show.

The people of Lawton opened their hearts and pocketbooks to help. Much of the materials and labor came from the area. "Although some of us gave up a little of our weekend or took a day or two of leave, many of the trade workers sacrificed wages as well," West said. "A number of the craftsmen took time off without pay."

It was a moving experience for Walt Garner, project manager. "The Westbrooks returned be greeted by thousands of well-wishers and a new, 4,000 square foot home completely handicap accessible and furnished with everything new, including landscaping and an automatic flagpole that raises the American flag at daylight and lowers it at night."

The Westbrooks' lives will never be the same, and the Corps volunteers said it was fulfilling to be part of such a large effort. Peggy Westbrook, Gene's wife, said the outpouring from the community was about one hand helping another hand, and is something that will live beyond the television show.



Bobber the Water Safety Dog makes friends at the Tiny Findings Daycare Center in the General Accounting Office Building. Toby Isbell, animator of the Bobber cartoons, is in the suit. (Photo by Marti Hendrix, HECSA)



Dannielle Huffman, a park ranger from Baltimore District demonstrates a lifejacket to a Soldier in the Pentagon. (Photo by F.T. Eyre, HECSA)

Park rangers bring water safety message to Pentagon and HQ

Article by Bernard Tate
Headquarters
Photos by F.T. Eyre
HECSA

A reptilian rides a high-tech vehicle through the Pentagon, escorted by people in uniform and bringing a message of safety and peace.

Elsewhere in the Pentagon, a tall aquatic rodent brings the same message in sign language.

It sounds like the scenario from a summer action movie, but in this case the "creatures" visiting the Pentagon were Seamoar the Sea Serpent and Buddy Beaver, the U.S. Army Corps of Engineers' mascots, their uniformed escorts were Corps' park rangers, and water safety was their summer action message.

It was all part of the park rangers third water safety education event at Headquarters and the Pentagon.

National water safety team

"The folks staffing the displays in Headquarters and the Pentagon are park rangers and the members of the National Water Safety Advisory Committee," said Lynda Nutt, manager of the National Operations Center for Water Safety. "Every three years I try to bring my water safety team to Headquarters so that they can meet the Corps' leadership, brief them about safety operations in the field, and get their philosophy about safety."

"So this is the year that the team comes to Headquarters, and we were asked if we could put on a water safety event that coincides with Headquarters' Earth Day celebration on April 19," said Nutt. "And when John Woodley, Jr., the Assistant Secretary of the Army (Civil Works), heard we were coming, he requested that we come to the Pentagon again, since we did an event there last year."

"We asked the rangers to come back because last year's event was very successful," said Col. Michael Donovan, Woodley's Executive Officer. "The Pentagon has a high concentration of people. We have 18,000 to 20,000 people who work here every day, plus a lot of visitors. If you want to get out the water safety message, the Pentagon is a good place. And a lot of people here have boats because Washington, DC is a big boating area. So you can target a lot of

people who will be out on the water."

The Corps rangers were in the Main Hallway of the Pentagon where Corridors One and Two meet.

"It's probably the best high traffic area we have right now," said Donovan. "Last year they were in the Concourse where we have a number of stores, so folks who were going to lunch or shopping saw the display. We don't have that opportunity this year. Because of Pentagon renovation the food court is shut down and the Concourse has limited space. But next to those areas that are closed, the best place is where they are, where people come in and out of the Pentagon on their way to the subway. They will have the best traffic as people enter and leave the building."

Pentagon operations

The high-traffic location worked its magic. The seven Corps rangers staffing the Pentagon Water Safety Display seldom had a quiet moment. There were almost always at least three or four people at the display, from all branches of the armed forces, all ranks, plus construction workers, visitors, and maintenance staff. The rangers were in constant motion answering water safety questions, joking with visitors, demonstrating the new auto-inflatable lifejackets, passing out water safety videos, Earth Day and water safety posters, and coloring books and flying rings printed with the water safety message.

People stopped by constantly to have their photos taken with Buddy Beaver (team leader Eugene Goff, a park ranger from The Dalles/John Day/Willow Creek Project in Portland District wore the suit), and to ask questions about Seamoar the Water Safety Sea Serpent animatronic robot.

"It's been like this all morning, ever since we get set up about 7 a.m.," said Dannielle Huffman, a park ranger from the Tioga-Hammond Project in Baltimore District, during a brief lull in the action.

Only in the Pentagon...

One of the park rangers, Phil Martinez from Abiquiu Lake in Albuquerque District, had an only-in-the-Pentagon moment.

"I saw a well-dressed man looking at our display, so I walked over talked to him about water safety and showed him how the new auto-inflatable

lifejackets work," said Martinez. "He said, 'You have a great display here, and you give a good presentation. I could talk to you all day, but I have to go.' He shook my hand and said 'Good job. Thank you,' and walked away. As he shook my hand he slipped me a Joint Chiefs of Staff coin! I don't know who he was. I like the diversity here; we can reach out to all kinds of people. I like it when I get to talk to a member of the Joint Chiefs of Staff, and then turn right around and talk to a Spanish-speaking cleaning lady."

Headquarters operations

On the other side of the Potomac River, the team of rangers in Headquarters had similar success. The newest member of the team was Bobber the Water Safety Dog, a costumed character from the popular cartoons produced by the National Water Safety Advisory Committee that bring the water safety message to elementary school students.

"Do you remember the children's book, 'If You Give a Mouse a Cookie,'" asked Nutt. "Well, if you give park rangers a water safety education tool, they'll want two. We have the Bobber the Water Safety dog cartoons, and the Bobber coloring books, so the Bobber costume was a natural extension of that."

At first glance, Bobber looks like any other character costume...big head, big feet, and furry suit. But the suit is more high-tech than it looks. It has a cooling vest with gel-packs that can be frozen and will help cool the wearer for up to two hours. The head also has a battery-powered fan that keeps some air moving around the wearer's face.

"Bobber has made only one other appearance, and that was at the International Boating and Water Safety Summit where we introduced him," said Nutt.

Bobber first visited the Tiny Findings Daycare Center in the General Accounting Office Building where Headquarters is located.

"The kids went nuts. They loved it," said Toby Isbell of Little Rock District, who wore the Bobber suit. Isbell is also the artist and animator of the Bobber cartoons. "At the end of the park ranger's water safety presentation, the kids came up and were hugging me. I had two or three kids hanging on each leg. When I sat down with them for a group

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Alaska dig sheds light on early Eskimos

By Pat Richardson
Alaska District

Contrary to popular view, Inupiat Eskimos may have lived on the Snake River Sandspit at Nome, Alaska, long before the late 1800s Gold Rush brought in thousands of people. New evidence of early Native culture was uncovered by Alaska District.

A construction contractor, working on a U.S. Army Corps of Engineers project to improve navigation at the Nome harbor, exposed a semi-subterranean house in 2005. Alaska District archaeologist Margan Grover excavated a second semi-subterranean house and trash midden (garbage dump) in 2006, recovering tools, pottery, carvings, and animal bones radiocarbon dated at about AD 1700.

While not old compared to other parts of the world, the 300-year-old find is significant because it reflects Native culture before contact with other people. Alaska was discovered by Russian explorers in 1741, at least 40 years after the Inupiat built these houses and crafted these tools. The archaeological evidence indicates that Native people lived at Nome long enough to build homes rather than just camping to hunt and fish.

"Until this find, people said that there were no Inupiat living on the site until after the Gold Rush," said Grover. "This confirms they were there before."

The Gold Rush started in 1898, quickly bringing more than 20,000 prospectors and opportunists to the northern beaches that became Nome. Today Nome, a community of 3,500 located 539 air miles northwest of Anchorage, is the supply, service, and transportation center of the Bering Strait region. Since Nome and 26 outlying villages are not connected by road to the rest of the state, the city's harbor is an important link in the region's supply chain.

Nome Harbor was one of the Corps' first navigation projects in Alaska. It was authorized in 1917 and construction of the original project began in 1919. In 2005, Alaska District started a \$36 million project to relocate the harbor's entrance channel. The project also included building a new breakwa-

ter, adding a spur to the end of the causeway, building a sediment trap, and replacing the existing causeway bridge.

When the contractor cut through the Snake River sandspit to create the new entrance channel, he discovered the first house pit in the middle of the channel in July 2005. The second house pit and a trash midden near the house were uncovered in 2006 beneath seven feet of overburden on the east side of the entrance channel.

While contractors lined the entrance channel with rock in 2006, Grover began excavation. The National Historic Preservation Act requires that historical and archaeological discoveries at construction sites be removed, catalogued, and conserved.

To keep the construction project on schedule as much as possible, Grover worked long hours and enlisted local Eskimo tribal members and community volunteers to help excavate the sites. Two Alaska District archaeology student hires, Helen Lindemuth and Aaron Wilson, also helped.

Grover says that the most exciting artifacts found at the sites are a "little man" the size of a small doll but more intricately carved, and an intact pottery cup. She has never seen a figure like the four-inch man carved from ivory at an archaeological site.

The cup is rare because people during the Late Western Thule period (1,050 years ago to about AD 1850) did not have kilns to fire their pottery. They fired their clay at a lower temperature in hot coals, resulting in fragile pieces. No one has ever seen complete pre-contact pottery from an archaeological site in Alaska.

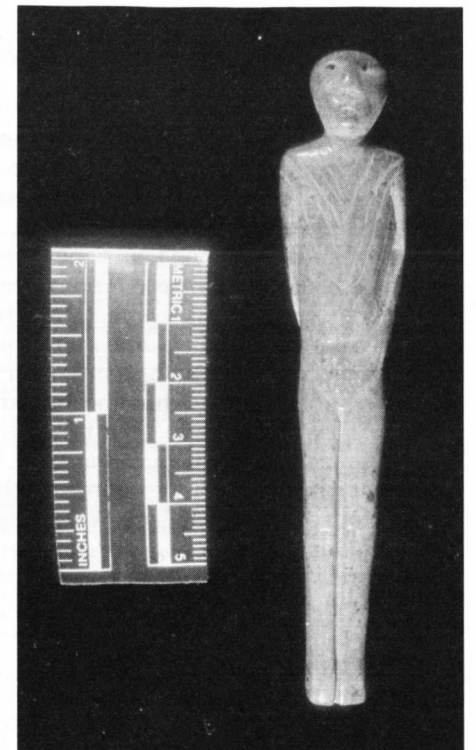
Grover said a tool cache is another important find because it has a complete set of hunting tools for the time period. The cache includes a net gauge for making fish nets, spearheads, harpoons, and tools made from wood, caribou antler, stone, bone, and ivory.

A device called an atlatl is interesting because not many have been found in Alaska. The atlatl was a "launcher" that allowed a hunter to throw spears further and with more force than he could with his arm alone.

Three harpoons made of ivory and



An excavation by archeologist Margan Grover proves that Eskimos were in the Nome area 300 years earlier than thought. A pottery cup and carved figurine were among the artifacts found. (Grover photo by Pat Richardson; pottery photo by Ed Ambrose; figurine photo courtesy of Alaska District)



ground slate are distinctive because the point was made by grinding a smooth sharp edge instead of flaking. Gut pulls, devices like needles with points at each end, were used to catch birds. The hunter would put a piece of meat on either end of the needle and tie it to a piece of string anchored to a post. When the bird ate the meat, it would swallow the needle. When it tried to leave, the needle lodged in the bird's gullet, effectively tying it to the stake.

Grover thinks the site was likely occupied late in the summer and into fall. She recovered remains of caribou, sea mammals, and salmon, all animals that come to the area during the late summer and fall. She found tools for hunting all these animals. The little man, drum handles, and other items indicate that the structures may have been used during the festival season, which takes place in winter.

Before carrying the artifacts to Anchorage for documentation, Grover and community volunteers took the artifacts to the local elementary and high

schools. Teachers incorporated local history and archaeology into their lesson plans so the children could relate their lessons to the artifacts.

Grover also displayed items at the Kawerak and Norton Sound Health Corporation board meetings, at the Nome Eskimo Community center, and the Old Saint Joseph Hall so local people could see them and share their knowledge of how the items were used.

After sharing them with community groups, Grover took the artifacts to Anchorage where she sent three samples to Beta Analytic, a lab in Florida, for radiocarbon dating. They came back dated at 300 to 350 years ago. She also conducted relative dating, comparing the artifact collection to artifacts from other sites that have been dated. This comparison matched the radiocarbon dating results.

Since the artifacts were found on land owned by the Nome, the city owns them. They will be displayed in their local museum, the Carrie M. McLain Memorial Museum.

Rangers

Continued from previous page

picture, they were all over me. I needed help to get up. This is the first big classroom group I've been in with the suit, and I was pleased with the results."

Isbell and his costume got a lot of positive response, and many people stopped to clown around and have their photo taken with Bobber, from anonymous passers-by to Maj. Gen. Ronald Johnson, the Deputy Commander of USACE.

Earth Day

The ranger's water safety messages were held in conjunction with the Corps' Earth Day celebration. Earth Day was April 22, a Sunday, but it was celebrated in Headquarters on April 19, a Thursday, to avoid conflicts with the weekend, and with Friday

alternate work schedules.

The Earth Day table featured energy conservation displays; hand-outs including EPA Sustainability playing cards, Army Earth Day Posters, and the Corps' Environmental Operating Principles; technical papers including "Renewable Energy Technology for Federal Facilities," and "Counting on Solar Power for Disaster Relief."

Folks who dropped by the Earth Day table could also pick up free French marigold seeds, and 23-watt compact fluorescent light bulbs to replace incandescent bulbs in their desk lamps.

"We're handing out the 23-watt compact fluorescent bulbs to draw people's attention to Executive Order 13423, 'Strengthening Federal Environmental, Energy, and Transportation Management,' which focuses on energy efficiency and reduction in our de-

pendence on petroleum consumption," said Jane Mergler, team leader of the Headquarters' Earth Day Display. "The flower seeds remind us that the Earth, our biosphere, is the giver and sustainer of life to include food, water, and even beauty."

Future developments

This was only the beginning for the Corps' current water safety campaign. A fourth Bobber the Water Safety Dog cartoon is in production now, and this summer all four will be recorded in Spanish. Phil Martinez is the voice of Ranger Toro, who will replace Ranger Buck as host in the Spanish language cartoons. The "edutainment" cartoons will complement the Bobber coloring/activity books, which are already written in both English and Spanish.

Clean-up of toxic aftermath continues

By Dave Harris
Louisiana Recovery Field Office

Toxic materials abandoned in homes and businesses in New Orleans are a hazard that lingers more than a year after the hurricanes. But the U.S. Army Corps of Engineers' Hazardous Household Waste facility can tame or reuse these dangerous items.

Flooded and abandoned Louisiana houses contained millions of household hazardous and toxic waste items, such as batteries, paint, aerosols, electronics, flammables, compressed gases, and ammunition.

By themselves, they don't seem dangerous...just the same items that anyone has in their kitchen, bathroom, or the shed outside. But taken together, millions of household products rusting and leaking, they represent a significant environmental threat.

The Household Hazardous Waste facility in New Orleans' Gentilly area was operated by the EPA to process such items. The Corps took over the facility last November. Workers wearing spacesuit-like protection gear have retrieved, sorted, and processed more than five million items, including:

Cleaning — Oven cleaners, drain cleaners, cleaners and polishes for wood and metal, toilet/tub/tile/shower cleaners, laundry bleach, pool chemicals.

Automotive -- Motor oil, fuel additives, injection cleaners, air conditioning refrigerants, starter fluids, auto batteries, transmission/brake fluids, antifreeze.

Lawn and garden -- Herbicides, insecticides, fungicides, wood preservatives.

Flammable -- Propane tanks and other compressed gas cylinders, kerosene, residential heating oil/diesel,



Toxic household materials of all kinds were abandoned in New Orleans after the hurricanes. (Photo courtesy of Louisiana Recovery Field Office)

gas, oil, lighter fluids.

Indoor pesticides — Ant/cockroach/flea/rodent sprays and baits.

Workshop/painting supplies -- Adhesives, glues, furniture strippers, oil/enamel based paints, stains and finishes, paint thinners and turpentine, paint removers, photographic and hobby chemicals.

Specific recycle usage includes:

Energy recovery: Paint-related materials, flammable liquids and solids.

Other recovery: Mercury, batteries, Freon, gas

cylinders (propane, acetylene, Freon), scrap metals, PCBs (high chlorinate solvents), and electronic waste.

Reclaim/reuse: Antifreeze and oil.

Tim Gouger, who oversees the facility operation, said crews recover many of the items and combustibles for beneficial use.

"Flammable materials become feedstock to fuel cement kilns," he said. Propane cylinders with valves that meet current specifications are palletized and trucked away by one of the larger consumer propane companies. "They reuse both the gas and cylinders."

The older cylinders with obsolete valves undergo a process in which the gas is burned off and the cylinders crushed and sold as scrap. Oxygen and gas cylinders are de-gassed, de-valved, and crushed as well.

Certain items and gasses are sent for offsite processing, such as Freon, ammonia, chlorine, and acetylene torches.

"More challenging are cylinders when we're not sure what's in them," Gouger said. "We send them offsite and tell processors what we *think* it is."

What about guns and ammunition?

"They're rust buckets," Gouger said. "The ammo has been under water and compromised. We send it to popping furnaces where it is detonated."

The serial numbers on the guns are reported to the proper authorities, and the guns themselves are melted down and the metals reused.

The facility does a robust business in any substance that is not regulated and has fuel potential. "Anything with recombinable oils and gasses," Gouger said. "The energy recovery industry creates our greatest demand."

HR Corner

DoD implements NSPS Spiral 1.3

The Department of Defense (DoD) has implemented the next phase of the National Security Personnel System (NSPS) implementation, Spiral 1.3. This spiral was deployed in Army for more than 26,000 non-bargaining unit civilian employees in two phases. The initial phase was effective March 18, and the second phase was implemented on April 15. USACE converted about 2000 non-bargaining unit employees in Jacksonville District, Omaha District, and the Equal Employment Opportunity (EEO) division. With the implementation of Spiral 1.3, USACE now has about 6,400 employees covered under NSPS.

As with any new system, there are many issues to address. The USACE NSPS Project Delivery Team (PDT) has led this initiative. It is a cross-functional team of managers, human resources specialists, labor counselors, EEO managers, and public affairs specialists. The team has been guided by the four key components needed to successfully transition to NSPS:

Leadership — Each USACE organization, at every level has identified an NSPS champion designated as the Transition Manager.

Training — PDT members, along with their partners in Civilian Personnel Advisory Centers, are leaders in attending and conducting NSPS training. PDT members, supervisors, and managers have been certified to conduct NSPS training throughout DoD. PDT members are involved corporately in scheduling and conducting training across USACE to ensure consistent delivery of high quality, effective training for USACE managers, supervisors, and employees.

Communication — Every employee and manager must be able to find information about NSPS and know where to go with questions. Communication has been continuous and through a variety of sources — training courses, newsletter articles, town halls, and information available through the DoD, Depart-

ment of the Army (DA) and USACE NSPS Web sites.

Lessons learned — Lessons learned are essential components in the USACE transition to NSPS and how the transition is planned, managed, executed, and evaluated. The USACE NSPS PDT conducts weekly teleconferences to plan, coordinate, integrate, and evaluate actions necessary to ensure a smooth transition into this new system. The PDT also gains valuable insights from bi-weekly DA NSPS teleconferences conducted with MACOMs, Direct Reporting Units, and field activities. The USACE NSPS PDT regularly conducts regional teleconferences to replicate the activities conducted at the national level and to identify issues to be addressed corporately.

Another way that the PDT has been instrumental in the USACE transition to NSPS is developing USACE interim guidance for NSPS implementation and execution. Guidance has been published in the areas of pay and compensation, pay pool development and management, staffing and employment, and position classification. This guidance has been distributed to commanders, directors, and human resources offices for re-distribution in their organizations.

Issues addressed in the guidance include delegations of authority, criteria for pay pool funding and structures, and similar matters. The guidance is designed to ensure consistent implementation of NSPS within USACE. The interim USACE guidance may be supplemented locally to ensure regional consistency.

DoD must develop a schedule for transitioning the final phase of non-bargaining unit employees into NSPS. Currently, this phase is projected for October. The interim DA and USACE guidance will be evaluated for effectiveness and possible revision as further lessons are learned from each phase of implementation. The next significant action for NSPS implementation will be conducting mock pay pools.

Under NSPS, pay and awards are affected by performance. Each employee's performance will be evaluated to determine if a pay increase and/or performance award is warranted. The pay pool process provides a way to ensure that all managers/supervisors apply standards equitably in the performance rating process and that pay for performance and awards provide incentive to the workforce.

The mock pay pool process will allow employees, supervisors, pay pool panel members, and pay pool managers to simulate the performance appraisal and pay pool process. Employees and managers will develop accomplishments and ratings used in this process. Appointed pay pool officials will execute the procedures to simulate the final approval of performance appraisals and pay-outs from the process. Lessons learned from this process will be incorporated into the USACE interim guidance for NSPS implementation.

Watch this space for feedback on how well we do, what we need to improve, and how we can effectively execute the actual performance appraisal and pay pool process. Managers and employees should consult with their local transition managers and human resources representatives if they have questions about NSPS implementation, need assistance with the guidance that has been published, or seek further information about the performance appraisal and pay pool process.

And to make sure all USACE members can stay current with the latest news regarding NSPS implementation, links to the DoD, DA, and USACE NSPS Web sites are below. Watch for continued updates on NSPS implementation within USACE.

DoD NSPS Web site: <http://www.cpms.osd.mil/nsps>

DA NSPS Web site: <http://cpol.army.mil/library/general/nsps>

USACE NSPS Web site: <http://www.hq.usace.army.mil/cepa/nsps/nsps.htm>

Around the Corps

Bobber the Water Safety Dog

With the new recreation season, the Corps has launched a full-scale water safety education effort, and something new is reaching children with the message — a Bobber, the Water Safety Dog costume.

"Bobber, the Water Safety Dog" is a nationwide program," said Lynda Nutt, manager of the National Operations Center for Water Safety. "We have costumes now that the districts can coordinate through us to use, or buy their own. We have Bobber the Water Safety dog cartoons, and Bobber coloring books, so the Bobber costume was a natural extension."

The Bobber suit looks like any character costume...big head, big feet, and furry suit. But the high-tech suit has a cooling vest with gel-packs that can be frozen and will help cool the wearer for up to two hours. The head also has a battery-powered fan that keeps air moving around the wearer's face.

The Bobber suit was introduced at the International Boating and Water Safety Summit, and made its first classroom appearance at the Tiny Findings Daycare Center in the General Accounting Office Building where Headquarters is located.

"The kids loved it," said Toby Isbell of Little Rock District, who wore the Bobber suit. Isbell is the artist and animator of the Bobber cartoons. "At the end of the park ranger's water safety presentation, the kids were hugging me. I had two or three kids hanging on each leg. When I sat down with them for a group picture, they were all over me. I was real pleased with the results."

"Anyone can request a Bobber-themed water safety presentation for their organization by contacting their local Corps water safety representative, or the national program to find a local rep," Isbell said.

Bobber's Web site, home of the popular water safety cartoons and other activities, is www.bobber.com. The Corps' National Water Safety Program Web site is <http://watersafety.usace.army.mil/>



Bobber the Water Safety Dog with Rick Bradford (left) and James Balch.

Ham radio

The Readiness Support Center (RSC) is attempting to identify all USACE personnel who are licensed amateur radio operators. Amateur radio has always been an essential part of the nation's first response during emergencies. USACE uses the same type of radios, traffic handling, and frequency band segments in our disaster communications plan as the amateur radio community. Amateur radio operators in USACE are a resource for initial communications needs during emergencies.

The RSC Communications Officer is attempting to locate as many Corps amateur radio operators as possible. They will receive a copy of the *USACE Communicator's Field Resource Guide*. Extra Class operators may have the opportunity for additional training if they meet certain criteria. Amateur radio operators interested in joining a Corps Amateur Radio Group, should contact the RSC Communications Officer at (251) 694-3605 (voice) or (251) 694-4405 (fax), or by e-mail charles.h.miller@us.army.mil

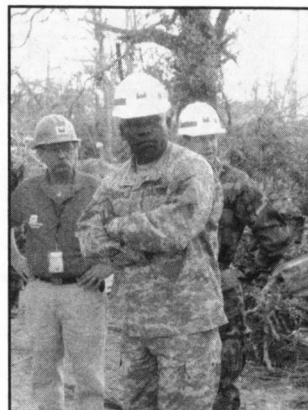
Leadership award

Brig. Gen. Robert Crear, Commander of Mississippi Valley Division, received the Distinguished Leader-

ship in Critical Infrastructure Resilience (Public Sector) award from The Infrastructure Security Partnership (TISP) at their annual conference in Arlington, Va.

This award recognizes individuals who have made a significant contribution to Critical Infrastructure Resilience. Two awards are presented each year, one for the public sector and one for private industry.

TISP defines critical infrastructure as systems, facilities, and assets so vital that if destroyed or incapacitated would disrupt security, the economy, health, safety, or welfare of the public. Crear received the award for his command of Task Force Hope, the ongoing recovery operation in New Orleans after Hurricanes Katrina and Rita.



Brig. Gen. Robert Crear at Waveland, Miss., ground zero of Hurricane Katrina's landfall.

Women of Discovery Award

Dr. Erin Pettit with the Fairbanks Office of the Cold Regions Research & Engineering Laboratory, recently received the 2007 Women of Discovery Award. She is one of five women, to include Jane Goodall, to be honored with this award.



Erin Pettit.

where they learn the scientific method of exploration while gaining mountaineering and wilderness skills.

Besides mentoring future female scientists, Pettit conducts critical research into the dynamic behaviors of ice divides, the movement of glaciers, and the formation of glacial ice cliffs. A trained glaciologist, Pettit joined CRREL's Terrestrial & Cryospheric Sciences Branch in December 2006 after a post-doc at the University of Washington and a research assistant professorship at Portland State University. Her area of expertise includes the interactions among glaciers, landscapes, climate, and oceans.

For more information about WINGS WorldQuest's The Women of Discovery Award, visit www.wingsworldquest.org. And to learn more about Girls on Ice, go to www.ncascades.org/programs/youth/girls_on_ice/index.html

Make a Difference

After a seven-month deployment to Iraq, and with her husband and four children beside her, Headquarters honored Capt. Candace Hurley on April 5 for engineering a cleanup project in Iraq last fall.

For the previous six years, Hurley had spent the fourth Friday of October working in national "Make a Difference Day." Although she was serving as Gulf Region Division's Deputy Personnel Officer in Baghdad

last year, she wanted to continue her tradition.

With the help of GRD Facilities Manager Stanley Brown and others, Hurley organized a cleanup to remove trash from a section of Haifa Street on Oct. 28.

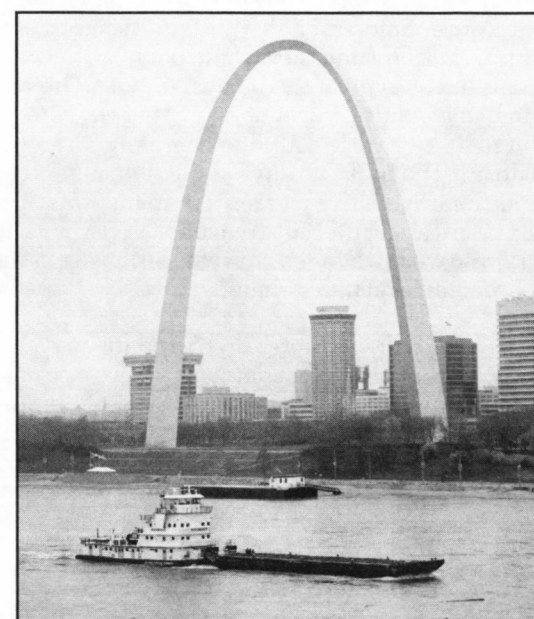
"Our theme was 'Clearing the Walkway to Peace,'" Hurley said. "The idea is to take a small step in the larger project for peace; it is the small efforts that make a big difference."

"More than 50 volunteers joined in the project, including military members from all services and DoD employees, Department of State employees, and contractors," Hurley said. "We worked for about four hours filling more than 100 bags (five truckloads worth) of trash, including dead palm trees, crumbled concrete, candy wrappers, soda bottles, and weeds. The best part of the event was that it spurred volunteerism in our Iraqi neighbors. Across the street several Iraqi citizens came out and began cleaning their sections as well. It was motivating, to say the least."

This project also captured the attention of Make a Difference Day sponsors *USA Weekend* magazine and actor-philanthropist Paul Newman. They selected it as one of 10 National Honorees to receive special recognition in the April 15 *USA Weekend*, and a \$10,000 check courtesy of Newman to be awarded to charity.

The Hurleys accepted the check from *USA Weekend* executive editor Jack Curry at the ceremony, and quickly passed it to a Global Impact representative. The money will go to the American Red Cross and the National Military Families Association.

"In the 16 years that *USA Weekend* magazine has sponsored Make a Difference Day, this is the first time we've presented an award for efforts that took place outside the U.S.," said Curry. "But Capt. Hurley is no stranger to Make a Difference Day, for six years she's helped others no matter where she was, from Fort Hood, Texas, to Fort Knox, Ky., to Baghdad."



MV Warren

The Corps newest vessel, the Motor Vessel *General Warren* steams past the Gateway Arch in St. Louis March 31. The vessel's new home will be St. Paul District. Built by Orange Shipbuilding in Orange, Tex., she was completed in February. The 124-foot-long, 33-foot-wide vessel is powered by two 1,500 horsepower diesels, and displaces 425 tons dry. Her fuel capacity is 32,000 gallons and she carries a crew of 11. The MV *General Warren* is named for the first St. Paul District Engineer, Gouverneur Kemble Warren, who commanded the district from 1866 to 1870. (Photo by Alan Dooley, St. Louis District)

Medal of Honor

Continued from page one

Moore closed the LZ to flight operations, and when Crandall returned to base, he learned that all medevac (medical evacuation) assistance had been cut off from the men of the 1st Bn., 7th Cav.

"The medevac pilots were all great pilots," Crandall said. "But they weren't allowed to land on a landing zone until it was 'green' for five minutes," meaning that it was not being relentlessly attacked.

Crandall made the decision, without anyone requesting that he do so, to fly the medevac missions. When he asked for volunteers, Maj. Ed Freeman (ret.) who had been his friend for 10 years before they deployed together to Vietnam, immediately stepped forward.

Crandall's helicopter led the two-bird flight, and he supervised the loading of seriously wounded Soldiers during 14 landings under intense enemy fire. He and Freeman saved the lives of about 70 wounded Soldiers. Freeman was awarded the Medal of Honor in July 2001.

"One of the principle reasons my company survived one of the largest and fiercest battles of the Vietnam War was the critical support provided by the aviators of Co. A, 229th Assault Helicopter Bn.," said Col. John Herren (ret.), who commanded the 1st Bn.'s Co. B during the battle.

"Those helicopters were our lifeline, as they brought battalion units into the LZ," he said. "They evacuated our wounded and brought in water and ammunition, despite intense enemy fire."

"I was an eyewitness to one of Crandall's flights," Herren added. "I was pinned down by intense enemy machine-gun and rifle that killed my radio operator and severely wounded the Co. D commander, Capt. Ray Lefebvre."

Crandall's helicopter landed and evacuated Lefebvre and others. The act of bravery "was extraordinary and inspirational," Herren said. "It demonstrated to me and other Soldiers that our casualties were going to be taken care of and they would not have to wait for a break in the fighting to be evacuated. The sheer volume of casualties was heavy. My own company suffered 46 casualties out of a company strength of 122 during the first two days of the fighting."

Additionally, one of Herren's platoons was cut off for 24 hours and suffered 20 casualties. Every one of the 12 who were wounded survived because Crandall and Freeman evacuated them.

None of this was easy on Crandall.

"If you break down in combat, someone can die," Crandall said. "I didn't cry or get angry. I threw up, because I really can't stand the sight or smell of blood."

"The first afternoon of the three-day battle was a



As a topographic engineer in the 1950s, Crandall flew the piston-powered OH-23 Raven over uncharted terrain. (U.S. Army Photo)

running firefight, with helicopters coming in under fire trying to get the wounded out," Moore said. "There was a hell of a fight the next morning and night, and I realized we were in an historic battle."

Moore learned later that three battalions of fresh North Vietnamese Army troops had come down the Ho Chi Minh Trail and were waiting for him and his 1st Battalion Soldiers.

"When the fight began, it was furious," said Moore. "The NVA troops came out intent on killing us all."

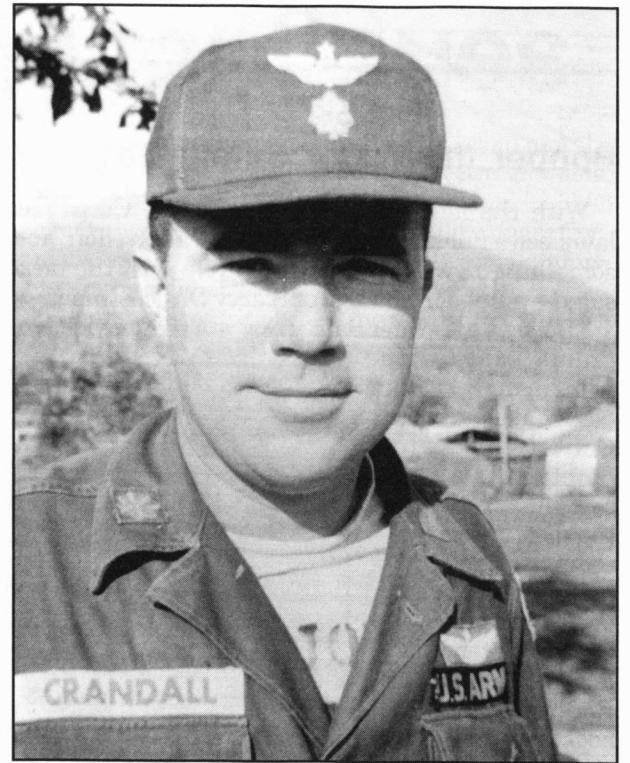
They were about 20 miles into enemy territory, and surrounded by a force seven times larger than their own, fighting in a space no bigger than a football field. The three-day battle, Nov. 14-16, left 79 U.S. infantrymen and one Air Force pilot dead, and another 130 men wounded. The fight was followed a day later, 14 miles away, by the battle at LZ Albany, during which 154 American troops were killed in an ambush.

The two battles were part of the 34-day Pleiku Campaign, which lasted from Oct. 23 to Nov. 26, 1965. Counting the skirmishes before and after the two major battles, 305 Americans died – more than the number of Soldiers killed during the entire first Gulf War.

During publicity for the film "We Were Soldiers," Moore said, "I hope soldiers who see the movie will get the lesson in their heads to never quit. Don't even think about losing. If you do, you've already lost."

That lesson is relevant today for Soldiers fighting in Iraq and Afghanistan, Army officials said. Crandall's much-deserved recognition for his part in the Ia Drang battle is a powerful reminder of what strong will of character and perseverance can overcome.

According to the MOH citation, "Major Crandall's bravery and daring courage to land under the most extreme hostile fire...instilled in the ground forces, the realization that friendly wounded would be promptly evacuated. This greatly enhanced morale



Crandall in Vietnam. (U.S. Army Photo)

and the will to fight at a critical time."

The citation continues, "He completed fourteen landings on medical and resupply missions under intense enemy fire and retired from the battlefield only after all possible service had been rendered to the infantry troops."

In fact, out of 31 helicopter loads of ammunition and supplies brought into the LZ after it was closed, Crandall's helicopter brought in 28 loads. And out of about 78 wounded in action who were evacuated, Crandall's flight took out 70.

Besides the medal itself, receiving the Medal of Honor confers a number of privileges, including:

- A special pension of \$1,027 per month.
- Special identification cards and commissary and exchange privileges for recipients and eligible dependents.
- Children of recipients are eligible for admission to U.S. military academies without regard to quota requirements.
- Recipients receive a 10 percent increase in retirement pay, subject to the 75 percent limit on total retired pay.
- Recipients receive the Medal of Honor flag.
- Retired personnel may wear the Medal of Honor on appropriate civilian clothing. Recipients of the medal are also allowed to wear the uniform at their pleasure, with standard restrictions on political, commercial, or extremist purposes.

(Heike Hasenauer is the Senior Editor of "Soldiers" magazine.)



Crandall (right) with Ed Freeman, who was awarded the Medal of Honor in July 2001 for his actions in the Ia Drang Valley. (U.S. Army Photo)



Crandall (left) with Greg Kinnear, the actor who portrayed him in the movie "We Were Soldiers Once." (U.S. Army Photo)